

TECHNICAL REPORT

November 2010

Child Safety Seat Usage in Illinois

July 2010 Observational Survey Results

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Illinois Department of Transportation Division of Traffic Safety Evaluation Unit

The Evaluation Unit, within the Division of Traffic Safety in the Illinois Department of Transportation, focuses on evaluation and monitoring of various highway safety projects and programs in Illinois. The Evaluation Unit conducts research and analyses that enhance the safety and efficiency of transportation by understanding the human factors that are important to transportation programs in Illinois. The main functions of the Unit include the following:

- 1. Develop an in-depth analysis of motor vehicle-related fatalities and injuries in Illinois using several crash-related databases (crash data, FARS, Trauma Registry, hospital data, and state and local police data).
- 2. Develop measurable long-term and short-term goals and objectives for the Highway Safety Program in Illinois using historical crash-related databases.
- 3. Evaluate each highway safety project with enforcement components (e.g., Traffic Law Enforcement Program, Local Alcohol Program, IMaGE projects) using crash and citation data provided by local and state police departments.
- Evaluate several highway safety programs (e.g., Occupant Protection and Alcohol). This
 involves evaluating the effects of public policy and intervention programs that promote safe
 driving.
- 5. Design and conduct annual observational safety belt and child safety seat surveys for Illinois. The safety belt survey is based on a multi-stage random selection of Interstate Highways, US/IL Highways, and several local and residential streets.
- 6. Provide results of research and evaluation as well as annual enforcement activities to the National Highway Traffic Safety Administration (NHTSA) as part of the Federal Requirements of State Highway Safety Program in Illinois.
- 7. Provide statistical consultation to other Sections at the Division of Traffic Safety and other Divisions at IDOT.
- 8. Publish results of all research and evaluation at the Division and place them as PDF files at IDOT's Website.

This report provides a descriptive analysis of child safety seat usage in Illinois. The survey was an observational survey conducted statewide during July 2010 at selected survey locations which included day care centers, health care centers, McDonald's restaurants, and shopping malls. This survey provided a statistically representative sample of child safety seat usage in the state of Illinois.

The report was compiled and prepared by the Evaluation staff. Comments or questions may be addressed to Mehdi Nassirpour, Ph.D., Chief of Evaluation Unit, Bureau of Administrative Services, Division of Traffic Safety, Illinois Department of Transportation, 1340 North Grand Avenue East, Springfield, Illinois 62702.

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Executive Summary

Using a multi-stage random sampling technique, a total of 3,182 children were observed in 2,329 passenger cars and pickup trucks in Illinois in 2010. There were a total of 119 randomly selected survey locations: 39 day care centers, 9 health care centers, 36 McDonald's restaurants, and 35 shopping malls within 12 selected counties. The counties were grouped into three different regions which included Cook County, the collar counties (DuPage, Kane, Lake, McHenry, and Will), and the downstate counties (Champaign, Macon, Montgomery, Peoria, Rock Island, and St. Clair).

It should be noted that in 2006, IDOT revised the definition of incorrect child restraint use. An incorrect child restraint use includes seat faces wrong way, harness loose or not used, retainer clip below armpit level, seat not secured, belt across face, and safety belt under arm. As result of this change, the correct restraint usage rate declined significantly. Therefore, comparing the current usage rates to the rates in previous years would not be valid. Here are the findings:

- 1. During July 2010, a total of 3,182 children were observed in 2,329 passenger cars, pickup trucks, and vans at selected day care centers, McDonald's restaurants, health care centers, and shopping malls across Illinois.
- 2. The total observed safety seat usage rate was 92.8 percent. When only including the observations where the safety seat was used properly, the usage rate drops to 44.9 percent.
- 3. The collar counties had the highest percentage of child restraint use at 96.9 percent. The child safety seat usage rate in Cook County and the downstate counties was 90.9 percent and 90.4 percent respectively. The collar counties had the highest percentage of properly restrained children at 51.4 percent. The percentage of properly restrained children in the downstate counties and Cook County was 47.1 percent and 39.9 percent respectively.
- 4. Shopping malls had the highest percentage of children who were restrained at 96.2 percent. The child safety seat usage rate at health care centers was 92.8 percent. The child safety seat usage rate at day care centers and McDonald's restaurants was 90.7 percent and 90.6 percent respectively. Based on proper child safety seat use, day care centers had the highest percentage of properly restrained children at 47.1 percent. The child safety seat usage rate at McDonald's restaurants and shopping malls was 45.2 percent and 43.7 percent respectively. Health care centers had the lowest percentage of properly restrained children at 41.6 percent.
- 5. Vans had the highest percentage of children who were restrained and properly restrained at 94.5 percent and 52.1 percent respectively. Almost 93 percent of children in automobiles were restrained. When excluding incorrect use, the child safety seat usage rate in automobiles was 43.8 percent. The child safety seat usage rate for pickup trucks was 90.9 percent. When excluding incorrect use, the child safety seat usage rate in pickup trucks was 41.1 percent.
- 6. When a female was driving, over 93 percent of children (93.1 percent) were restrained and only 45.0 percent of children were properly restrained. Similarly, when a male was driving, over 92 percent (92.2 percent) of children were restrained and only 44.7 percent of children were properly restrained.

- 7. When a driver was wearing their safety belt, almost 95 percent of children were restrained. When excluding incorrect use, only 45.8 percent of these children were properly restrained. On the other hand, unbelted drivers tend to have significantly lower child restraint usage rates than belted drivers. When a driver was not wearing their safety belt, only 81.9 percent of children were restrained. When excluding incorrect use, only 39.0 percent of these children were properly restrained.
- 8. The total usage rate from 2001 thru 2010 increased significantly by 14.8 percentage points from 78.0 percent in 2001 to 92.8 percent in 2010. The rate of increase ranges from 12.1 percent for vehicle with one child to 44.1 percent for vehicles with four children.
- 9. Since IDOT revised the definition of correct child safety seat use in 2006, it would not be valid to compare the usage rate during the current years (2006-2009) to the years prior to 2006. The correct usage rate of restrained children decreased by 9.0 percentage points from 53.9 percent in 2006 to 44.9 percent in 2010. During 2010, contrary to our expectation, the correct usage rate decreased across all vehicles regardless how many children were in the vehicle.

Observational Survey

Using a multi-stage random sampling technique, a total of 3,182 children were observed in 2,329 passenger cars and pickup trucks in Illinois in 2010. There were a total of 119 randomly selected survey locations: 39 day care centers, 9 health care centers, 36 McDonald's restaurants, and 35 shopping malls within 12 selected counties. The counties were grouped into three different regions which included Cook County, the collar counties (DuPage, Kane, Lake, McHenry, and Will), and the downstate counties (Champaign, Macon, Montgomery, Peoria, Rock Island, and St. Clair). The survey design had four characteristics:

- 1. The survey was conducted between 6:30 a.m. and 6:00 p.m. when the light was adequate for observation.
- 2. The survey was restricted to a total of 30 observations or an hour of observation per site.
- 3. The survey was conducted at the exit/entrance of selected locations.
- 4. The survey included the following common misuses of child safety seats:
 - seat faces wrong way,
 - harness loose or not used,
 - · retainer clip below armpit level,
 - seat not secured.
 - · belt across face, and
 - safety belt under arm.

It should be noted that in 2006, IDOT revised the definition of an incorrect child restraint use. As result of this change, the correct restraint usage rate declined significantly. Therefore comparing the current usage rates to the rates prior to 2006 would not be valid.

For more information on the design of the survey refer to "Design of the Child Safety Seat Survey", Division of Traffic Safety, Illinois Department of Transportation (IDOT), June 1996.

Results of Child Safety Seat Survey in Illinois

Tables 1 through 7 provide descriptive information on the child safety seat usage rate and its correlates, such as gender of driver, belt status of driver, location type, region, and vehicle type in 2010.

Table 1 shows that the overall child restraint usage rate in Illinois is 92.8 percent. After excluding total number of observations in which the child restraint is used incorrectly, the usage rate is reduced to 44.9 percent. As was expected, child safety restraint usage rates are inversely related to the number of children in the car. It is likely to see usage rates decrease as the number of children in the vehicle increase. The usage rate and correct usage rate for Child 1 are 93.1 percent and 43.5 percent respectively. On the other hand, these percentages are lower for Child 3 at 82.8 percent and 20.4 percent respectively.

Table 1: 2010 Child Safety Seat Usage Rate in Illinois

Seating Position	No Restraint	Incorrect Use	Correct Use	Total Observed	Usage Rate Total	Usage Rate (excludes incorrect use)
Child 1	160	1,155	1,014	2,329	93.1%	43.5%
Child 2	52	305	396	753	93.1%	52.6%
Child 3	16	58	19	93	82.8%	20.4%
Child 4	2	5	0	7	71.4%	0.0%
Total	230	1,523	1,429	3,182	92.8%	44.9%

Note: Common misuses of child safety seats include seat faces wrong way, harness loose or not used, retainer clip below armpit level, seat not secured, belt across face, and safety belt under arm.

Table 2 presents frequency and percentage distributions for selected demographics, including type of vehicle, driver's gender, driver's belt status, and total vehicles observed by site type. As expected, the largest percentage of vehicles observed were automobiles (67.1 percent). The percentage of vans and trucks observed were 17.5 percent and 17.4 percent respectively. Based on driver's gender, almost 64 percent (63.8 percent) of the drivers observed were female, while only 36.2 percent of the observations were male. Based on driver's belt status, more than 86 percent (86.8 percent) of drivers were observed wearing their seat belts, while the remaining 13.2 percent were unbelted. Based on location type, the largest percentage of vehicles was observed at shopping malls (36.5 percent). More than 31 percent of the vehicles

were observed at McDonald's restaurants and 26.2 percent were observed at day care centers. The smallest percentage of vehicles was observed at health care centers (6.0 percent).

Table 2: Frequency and Percentage Distributions of Selected Demographics for the 2010 Child Safety Seat Survey

2010 Cillia Salety Seat Survey									
Type of Ve	hicle								
	Frequency	Percentage							
Automobile	1,514	65.1%							
Truck	404	17.4%							
Van	406	17.5%							
TOTAL	2,324	100.0%							
Driver's Gender									
Frequency Percentage									
Female	1,483	63.8%							
Male	842	36.2%							
TOTAL	2,325	100.0%							
Driver's Belt	Status								
	Frequency	Percentage							
Belted	2,012	86.8%							
Not Belted	305	13.2%							
TOTAL	2,317	100.0%							
Total Vehicles Observed	by Location Ty	oe							
	Frequency	Percentage							
Daycare	610	26.2%							
Health Center	140	6.0%							
McDonald's	730	31.3%							
Shopping Mall	849	36.5%							
TOTAL	2,329	100.0%							
TOTAL	2,329	100.0%							

*Note: The Totals are different for each demographic due to missing values. Due to rounding error, percentages may not equal 100 percent.

Table 3 shows frequency and percentage distributions of child restraint use by selected regions of Illinois (collar counties, Cook County, and downstate counties). The collar counties had the highest percentage of child restraint use at 96.9 percent. The child safety seat usage rate in Cook County and the downstate counties was 90.9 percent and 90.4 percent respectively. The collar counties had the highest percentage of properly restrained children at 51.4 percent. The percentage of properly restrained children in the downstate counties and Cook County was 47.1 percent and 39.9 percent respectively.

Table 3: Analysis of the 2010 Child Safety Seat Survey
Child Restraint Status by Region

			Regi	ion				
Child Restraint Status	Collar Counties**		Cook County		Downstate Counties***		Totals	
	N	%	N	%	N	%	N	%
Properly Restrained	540	51.4%	633	39.9%	256	47.1%	1,429	44.9%
Incorrectly Restrained	478	45.5%	809	51.0%	236	43.4%	1,523	47.9%
Total Restrained*	1,018	96.9%	1,442	90.9%	492	90.4%	2,952	92.8%
Not Restrained	33	3.1%	145	9.1%	52	9.6%	230	7.2%
Column Totals	1,051	100.0%	1,587	100.0%	544	100.0%	3,182	100.0%

^{*} The row 'Total Restrained' is the sum of the cases from the rows 'Properly Restrained' and 'Incorrectly Restrained'

Table 4 provides information on child restraint usage rates by location type. The location types included day care centers, health care centers, McDonald's restaurants, and shopping malls. Shopping malls had the highest percentage of children who were restrained at 96.2 percent. The child safety seat usage rate at health care centers was 92.8 percent. The child safety seat usage rate at day care centers and McDonald's restaurants was 90.7 percent and 90.6 percent respectively. Based on proper child safety seat use, day care centers had the highest percentage of properly restrained children at 47.1 percent. The child safety seat usage rate at McDonald's restaurants and shopping malls was 45.2 percent and 43.7 percent respectively. Health care centers had the lowest percentage of properly restrained children at 41.6 percent.

^{**} The collar counties are comprised of DuPage, Kane, Lake, McHenry, & Will

^{***} The downstate counties are comprised of Champaign, Macon, Montgomery, Peoria, Rock Island, & St. Clair

Table 4: Analysis of the 2010 Child Safety Seat Survey Child Restraint Status by Location Type

				Locat	ion Typ	е				
Child Restraint Status	Day Care Center		Health Care Center		McDonald's		Shopping Mall		Totals	
	N	%	N	%	N	%	N	%	N	%
Properly Restrained	390	47.1%	87	41.6%	455	45.2%	497	43.7%	1,429	44.9%
Incorrectly Restrained	361	43.6%	107	51.2%	457	45.4%	598	52.5%	1,523	47.9%
Total Restrained*	751	90.7%	194	92.8%	912	90.6%	1,095	96.2%	2,952	92.8%
Not Restrained	77	9.3%	15	7.2%	95	9.4%	43	3.8%	230	7.2%
Column Totals	828	100.0%	209	100.0%	1,007	100.0%	1,138	100.0%	3,182	100.0%

^{*} The row 'Total Restrained' is the sum of the cases from the rows 'Properly Restrained' and 'Incorrectly Restrained'

Table 5 shows child restraint use by vehicle type, including automobiles, pickup trucks, and vans. Vans had the highest percentage of children who were restrained and properly restrained at 94.5 percent and 52.1 percent respectively. Almost 93 percent of children in automobiles were restrained. When excluding incorrect use, the child safety seat usage rate in automobiles was 43.8 percent. The child safety seat usage rate for pickup trucks was 90.9 percent. When excluding incorrect use, the child safety seat usage rate in pickup trucks was 41.1 percent.

Table 5: Analysis of the 2010 Child Safety Seat Survey Child Restraint Status by Vehicle Type

			Vehicl	е Туре			Totals**		
Child Restraint Status	Automobile		Tru	ıck	Va	an	iotais		
- Clarido	N	%	N	%	N	%	N	%	
Properly Restrained	877	43.8%	230	41.1%	320	52.1%	1,427	44.9%	
Incorrectly Restrained	982	49.0%	278	49.7%	260	42.3%	1,520	47.9%	
Total Restrained*	1,859	92.8%	508	90.9%	580	94.5%	2,947	92.8%	
Not Restrained	144	7.2%	51	9.1%	34	5.5%	229	7.2%	
Column Totals	2,003	100.0%	559	100.0%	614	100.0%	3,176	100.0%	

^{*} The row 'Total Restrained' is the sum of the cases from the rows 'Properly Restrained' and 'Incorrectly Restrained'

Table 6 shows that male and female drivers have similar child safety seat usage rates. When a female was driving, over 93 percent of children (93.1 percent) were restrained and only 45.0 percent of children were properly restrained. Similarly, when a male was driving, over 92 percent (92.2 percent) of children were restrained and only 44.7 percent of children were properly restrained.

^{**} The total does not equal 3,182 cases due to missing data.

Table 6: Analysis of the 2010 Child Safety Seat Survey Child Restraint Status by Driver's Gender

		Driver's		Totals**			
Child Restraint Status	Ma	ale	Fen	nale	lotais		
	N	%	N	%	N	%	
Properly Restrained	505	44.7%	919	45.0%	1,424	44.9%	
Incorrectly Restrained	538	47.6%	983	48.1%	1,521	47.9%	
Total Restrained*	1,043	92.2%	1,902	93.1%	2,945	92.8%	
Not Restrained	88	7.8%	142	6.9%	230	7.2%	
Column Totals	1,131	100.0%	2,044	100.0%	3,175	100.0%	

^{*} The row 'Total Restrained' is the sum of the cases from the rows 'Properly Restrained' and 'Incorrectly Restrained'

Table 7 shows frequency and percentage distributions of child restraint use by driver's belt status. As indicated earlier (see **Table 2**), almost 87 percent of all drivers observed with children in their vehicles were wearing their safety belts (2,012 belted drivers divided by 2,317 total observations multiplied by 100 percent). Belted drivers have significantly higher child safety seat usage rates and proper child safety seat usage rates than unbelted drivers. When a driver was wearing their safety belt, almost 95 percent of children were restrained. When excluding incorrect use, only 45.8 percent of these children were properly restrained. On the other hand, unbelted drivers tend to have significantly lower child restraint usage rates than belted drivers. When a driver was not wearing their safety belt, only 81.9 percent of children were restrained. When excluding incorrect use, only 39.0 percent of these children were properly restrained.

Table 7: Analysis of the 2010 Child Safety Seat Survey Child Restraint Status by Driver's Belt Status

		Driver's B		Totals**			
Child Restraint Status	Driver	Belted	Driver U	Inbelted	lotais		
	N	%	N	%	N	%	
Properly Restrained	1,241	45.8%	177	39.0%	1,418	44.8%	
Incorrectly Restrained	1,322	48.8%	195	43.0%	1,517	48.0%	
Total Restrained*	2,563	94.6%	372	81.9%	2,935	92.8%	
Not Restrained	145	5.4%	82	18.1%	227	7.2%	
Column Totals	2,708	100.0%	454	100.0%	3,162	100.0%	

^{*} The row 'Total Restrained' is the sum of the cases from the rows 'Properly Restrained' and 'Incorrectly Restrained'

^{**} The total does not equal 3,182 cases due to missing data.

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Historical Trends of Child Safety Seat Use

Tables 8 and 9 show historical trends on child safety usage rates. **Table 8** provides information about total child restraint usage rates for 2001 thru 2010. As show in this table, the total usage rate increased significantly by 14.8 percentage points from 78.0 percent in 2001 to 92.8 percent in 2010. The rate of increase ranges from 12.1 percent for vehicle with one child to 44.1 percent for vehicles with four children.

Table 9 provides information about the correct usage rate of restrained children for only 2006 thru 2010 eliminating years prior to 2006. As indicated earlier, since IDOT revised the definition of correct child safety seat use in 2006, it would be incorrect to compare the usage rate during the current years (2006-2010) to the years prior to 2006. As shown in this table, the correct usage rate of restrained children decreased by 9.0 percentage points from 53.9 percent in 2006 to 44.9 percent in 2010. During 2010, contrary to our expectation, the correct usage rate decreased across all vehicles regardless how many children were in the vehicle.

Table 10 shows comparative analyses of child safety seat usage rates for 2001 through 2010. The data was analyzed by selected demographics including region, location, vehicle type, driver's gender, and driver's belt status. The information in **Table 10** is displayed in graphic presentations of child safety seat usage rates by selected demographics in **Figures 1 through 5**. The percent change in **Table 10** is calculated by subtracting the 2001 usage rates from the 2010 usage rates.

Figure 1 shows the total usage rate of restrained children by the selected regions in Illinois. From 2001 to 2010, all regions noticed increases in child safety seat use. The child safety seat usage rate in the collar counties increased from 71.5 percent in 2001 to 96.9 percent in 2010. In the downstate counties, the child safety seat usage rates increased from 77.2 percent in 2001 to 90.4 percent in 2010. In Cook County, the child safety seat usage rate increased from 81.2 percent in 2001 to 90.9 percent in 2010.

Figure 2 shows the total child safety seat usage rate by location type in Illinois. From 2001 to 2010, the total usage rate of restrained children increased at all location types. The total usage rate at McDonald's increased from 67.6 percent in 2001 to 90.6 percent in 2010. The total usage rate at health care centers increased from 74.3 percent in 2001 to 92.8 percent in 2010.

The total usage rate for shopping malls increased from 81.8 percent in 2001 to 96.2 percent in 2010. The total usage rate at day care centers increased from 83.7 percent in 2001 to 90.7 percent in 2010.

Figure 3 shows the total usage rate of restrained children by vehicle type in Illinois. From 2001 to 2010, the total usage rate increased across all vehicles. In automobiles, the total usage rate of restrained children increased by 16.8 percentage points (an increase from 76.0 percent in 2001 to 92.8 percent in 2010). In vans, the total usage rate of restrained children increased from 82.0 percent in 2001 to 94.5 percent in 2010. In pickup trucks, the total usage rate of restrained children increased by 10.1 percentage points (an increase from 80.8 percent in 2001 to 90.9 percent in 2010).

Figure 4 shows the total usage rate of restrained children by driver's gender in Illinois. From 2001 to 2010, the total usage rate of restrained children for male drivers increased by 18.7 percentage points and for female drivers it increased by 12.7 percentage points.

Figure 5 shows the total usage rate of restrained children by the driver's belt status across selected years in Illinois. As was expected, the usage rates of child seats were significantly higher for belted drivers than for unbelted drivers. Although the total child safety seat usage rate for belted drivers slightly increased by 3.4 percentage points from 2001 through 2010, the total child safety seat usage rate for unbelted drivers increased by 30.1 percentage points.

TABLE 8
Total Child Safety Seat Usage Rates in Illinois (2001-2010)

		Total Usage Rate of Restrained Children										
Child Number	Total Use (2001)	Total Use (2003)	Total Use (2005)	Total Use (2006)	Total Use (2007)	Total Use (2008)	Total Use (2009)	Total Use (2010)	Percent Change* (2001-2010)			
Statewide	78.0%	83.0%	87.7%	85.4%	87.2%	87.7%	90.7%	92.8%	14.8%			
Child #												
Child 1	81.0%	85.3%	89.4%	87.4%	88.8%	90.5%	92.1%	93.1%	12.1%			
Child 2	74.5%	80.0%	85.3%	79.7%	84.2%	84.7%	88.3%	93.1%	18.6%			
Child 3	51.1%	64.9%	75.0%	76.5%	75.8%	63.0%	78.4%	82.8%	31.7%			
Child 4	27.3%	50.0%	60.0%	72.7%	60.0%	50.0%	45.5%	71.4%	44.1%			

^{*} Percent change was calculated by subtracting the 2001 Total Usage Rate from the 2010 Total Usage Rate.

TABLE 9
Correct Child Safety Seat Usage Rates in Illinois (2006-2010)

(2000-2010)											
Child	Correct Usage Rate of Restrained Children (excludes Incorrect Use)										
Number	Proper Use (2006)	Proper Use (2007)	Proper Use (2008)	Proper Use (2009)	Proper Use (2010)	Percent Change* (2006-2010)					
Statewide	53.9%	53.6%	56.4%	47.7%	44.9%	-9.0%					
Child #											
Child 1	55.3%	54.2%	56.9%	47.7%	43.5%	-11.8%					
Child 2	51.7%	54.1%	58.6%	50.0%	52.6%	0.9%					
Child 3	38.3%	37.4%	38.0%	35.2%	20.4%	-17.9%					
Child 4	36.4%	33.3%	32.1%	0.0%	0.0%	-36.4%					

^{*} Percent change was calculated by subtracting the 2006 Proper Usage Rate from the 2010 Proper Usage Rate.

Table 10 Child Safety Seat Usage in Illinois by Selected Characteristics

(2001-2010)

				Tot	al Usage	Rate			
				of Res	strained C	hildren			
	Usage	Usage	Usage	Usage	Usage	Usage	Usage	Usage	Percent
	Rate	Rate	Rate	Rate	Rate	Rate	Rate	Rate	Change*
	2001	2003	2005	2006	2007	2008	2009	2010	
Statewide	78.0%	83.0%	87.7%	85.4%	87.2%	87.7%	90.7%	92.8%	14.8%
Region									
Cook County	81.2%	85.2%	90.3%	82.4%	84.1%	85.2%	90.6%	90.9%	9.7%
Collar Counties	71.5%	82.4%	87.3%	88.0%	93.4%	94.4%	93.5%	96.9%	25.4%
Downstate									
Counties	77.2%	78.9%	81.5%	86.7%	86.9%	85.5%	87.3%	90.4%	13.2%
Location									
Day Care Center	83.7%	87.0%	94.1%	85.5%	86.6%	88.4%	89.5%	90.7%	7.0%
Health Center	74.3%	79.2%	84.2%	82.5%	90.7%	88.3%	85.2%	92.8%	18.5%
McDonald's	67.6%	79.2%	83.9%	80.1%	83.1%	83.5%	87.9%	90.6%	23.0%
Shopping Mall	81.8%	83.2%	86.6%	89.4%	90.7%	90.7%	94.8%	96.2%	14.4%
Vehicle Type									
Automobile	76.0%	82.9%	88.0%	84.6%	87.2%	86.8%	90.5%	92.8%	16.8%
Truck	80.8%	75.7%	87.1%	79.4%	79.4%	84.2%	88.2%	90.9%	10.1%
Van	82.0%	85.4%	92.2%	88.8%	88.6%	92.3%	93.0%	94.5%	12.5%
Gender									
Male	73.5%	81.8%	86.3%	80.0%	86.4%	85.9%	90.5%	92.2%	18.7%
Female	80.4%	83.7%	88.6%	87.6%	87.6%	88.7%	90.9%	93.1%	12.7%
Driver's Belt									
Status									
Belted	91.2%	94.0%	95.9%	91.6%	92.2%	92.7%	95.1%	94.6%	3.4%
Unbelted	51.8%	57.1%	62.6%	62.4%	68.1%	66.8%	65.7%	81.9%	30.1%

^{*} Percent change is calculated by substracted the 2001 usage rates from the 2010 usage rates.









